AMENDMENT

Please amend the pending application in accordance with the following particulars.

In the Claims

The claims are amended as shown on the following pages under the heading LIST OF CURRENT CLAIMS. The list shows the status of all claims presently in the application and is intended to supersede all prior versions of the claims in the application. Any cancellation of claims is made without prejudice or disclaimer.

LIST OF CURRENT CLAIMS

1. (Currently Amended) A rare earth oxide superconductor comprising a metal substrate; an intermediate layer formed on the surface of the metal substrate by sequentially disposing a first intermediate cerium-based oxide layer comprising cerium and a solid solution formation element capable of forming a solid solution with cerium, and a second intermediate cerium-based oxide layer, different from the first intermediate cerium-based oxide layer and comprising cerium and a charge compensation element capable of compensating for a charge mismatch attributable to a difference between the electron valences of respective ions of cerium and the solid solution formation element; and a rare earth oxide superconductive layer formed on the intermediate layer and having a critical temperature (Tc) of 85-88° K.

2 - 3. (Canceled)

4. (Currently amended) The rare earth oxide superconductor according to claim 1, wherein the solid solution formation element consists of one ~~any of 1 type or 2 types~~ or more ~~of~~ rare earth elements selected from the group consisting of Y, Nd, Sm, Gd, Eu, Yb, Ho, Tm, Dy, La and Er.

5. (Currently amended) The rare earth oxide superconductor according to claim 4 [[1]], wherein the charge compensation element consists of one ~~any of 1 type or 2 types~~ or more elements selected from the group consisting of Bi, Nb, Sb, Ta and V.

6. (Currently amended) The rare earth oxide superconductor according to claim 1, wherein the content of the solid solution formation element of the first intermediate cerium-based oxide layer is 5 to 60 mol% in terms of the metal content.

7. (Currently amended) The rare earth oxide superconductor according to claim 1, wherein the content of the charge compensation element in the second intermediate cerium-based oxide layer is 5 to 60 mol% in terms of the metal content.

8. (Canceled)

9. (Currently amended) The rare earth oxide superconductor according to claim 1 [[3]], wherein the total ~~summation~~ of the solid solution formation element and the charge compensation element in the intermediate layers ~~layer~~ is 5 to 60 mol% in terms of the metal content.

10. (Canceled)

11. (Previously Presented) The rare earth oxide superconductor according to claim 1, wherein the metal substrate is a biaxially aligned metal substrate.

12. (Currently Amended) A method for producing a rare earth oxide superconductor comprising the steps of applying a mixed solution, on the surface of a metal substrate, comprising an organometallic acid salt of cerium and an organometallic acid salt of one ~~any 1 type or 2 types~~ or more ~~of~~ solid solution formation elements capable of forming a solid solution with cerium and selected from the group consisting of [[()]]Y, Nd, Sm, Gd, Eu, Yb, Ho, Tm, Dy, La and Er,[[)]] and then preliminarily calcining the same to form a first cerium-based oxide intermediate ~~coated~~ layer; applying a mixed solution, on the first cerium-based oxide intermediate ~~coated~~ layer, comprising an organometallic acid salt of cerium and an organometallic acid salt of one ~~any of 1 type or 2 types~~ or more of a charge compensation element capable of compensating for a charge mismatch attributable to a difference between the electron valences of respective ions of cerium and the solid solution formation

element and selected from the group consisting of [[(]]Bi, Nb, Sb, Ta and V_2[[)]] to form a second cerium-based oxide intermediate ~~coated~~ layer followed by ~~carrying out~~ a heat treatment in a reducing atmosphere under a pressure ranging from 0.1 Pa to below atmospheric pressure and a temperature in a range ~~ranging~~ from 900 to 1200°C to form a cerium-based oxide ~~an~~ intermediate layer including the first and second cerium-based oxide intermediate layers; and then forming by an MOD method a rare earth oxide superconductive layer on the intermediate layer.

13. (Currently Amended) The method for producing a rare earth oxide superconductor according to claim 12, wherein each of the solid solution formation element in the first cerium-based oxide intermediate ~~coated~~ layer and the charge compensation element in the second cerium-based oxide intermediate ~~coated~~ layer is 5 to 60 mol% in terms of the metal content.

14 - 17. (Canceled)

18. (Currently amended) The method for producing a rare earth oxide superconductor according to claim 12, wherein the cerium-based oxide intermediate layer is formed by calcination in a reducing atmosphere under a pressure in a range ~~ranging~~ from 10 to 500 Pa and a temperature ranging from 950 to 1150°C.

19-26. (Canceled)

27. (New) The rare earth oxide according to claim 1 wherein the solid solution formation element is Gd and the charge compensation element is Nb.

28. (New) The method for producing a rare earth oxide superconductor according to claim 12 wherein the solid solution formation element is Gd and the charge compensation element is Nb.